UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

# NOTICE OF ALLOWANCE AND FEE(S) DUE

80600

7590

05/28/2010

Harness, Dickey and Pierce, P.L.C. 5445 Corporate Drive Troy, MI 48098 EXAMINER
EGWIM, KELECHI CHIDI
ART UNIT PAPER NUMBER

1796 DATE MAILED: 05/28/2010

APPLICATION NO. FILI		FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
	10/510,993	10/12/2004	Winfried Stubbe	PAT-01026	8766

TITLE OF INVENTION: AQUEOUS DISPERSION OF INORGANIC NANOPARTICLES, METHOD FOR THE PRODUCTION AND USE THEREOF

APPLN. TYPE	SMALL ENTITY	ISSUE FEE DUE	PUBLICATION FEE DUE	PREV. PAID ISSUE FEE	TOTAL FEE(S) DUE	DATE DUE
nonprovisional	NO	\$1510	\$300	\$0	\$1810	08/30/2010

THE APPLICATION IDENTIFIED ABOVE HAS BEEN EXAMINED AND IS ALLOWED FOR ISSUANCE AS A PATENT. PROSECUTION ON THE MERITS IS CLOSED. THIS NOTICE OF ALLOWANCE IS NOT A GRANT OF PATENT RIGHTS. THIS APPLICATION IS SUBJECT TO WITHDRAWAL FROM ISSUE AT THE INITIATIVE OF THE OFFICE OR UPON PETITION BY THE APPLICANT. SEE 37 CFR 1.313 AND MPEP 1308.

THE ISSUE FEE AND PUBLICATION FEE (IF REQUIRED) MUST BE PAID WITHIN THREE MONTHS FROM THE MAILING DATE OF THIS NOTICE OR THIS APPLICATION SHALL BE REGARDED AS ABANDONED. THIS STATUTORY PERIOD CANNOT BE EXTENDED. SEE 35 U.S.C. 151. THE ISSUE FEE DUE INDICATED ABOVE DOES NOT REFLECT A CREDIT FOR ANY PREVIOUSLY PAID ISSUE FEE IN THIS APPLICATION. IF AN ISSUE FEE HAS PREVIOUSLY BEEN PAID IN THIS APPLICATION (AS SHOWN ABOVE), THE RETURN OF PART B OF THIS FORM WILL BE CONSIDERED A REQUEST TO REAPPLY THE PREVIOUSLY PAID ISSUE FEE TOWARD THE ISSUE FEE NOW DUE.

#### HOW TO REPLY TO THIS NOTICE:

I. Review the SMALL ENTITY status shown above.

If the SMALL ENTITY is shown as YES, verify your current SMALL ENTITY status:

A. If the status is the same, pay the TOTAL FEE(S) DUE shown above.

B. If the status above is to be removed, check box 5b on Part B - Fee(s) Transmittal and pay the PUBLICATION FEE (if required) and twice the amount of the ISSUE FEE shown above, or

If the SMALL ENTITY is shown as NO:

A. Pay TOTAL FEE(S) DUE shown above, or

B. If applicant claimed SMALL ENTITY status before, or is now claiming SMALL ENTITY status, check box 5a on Part B - Fee(s) Transmittal and pay the PUBLICATION FEE (if required) and 1/2 the ISSUE FEE shown above.

II. PART B - FEE(S) TRANSMITTAL, or its equivalent, must be completed and returned to the United States Patent and Trademark Office (USPTO) with your ISSUE FEE and PUBLICATION FEE (if required). If you are charging the fee(s) to your deposit account, section "4b" of Part B - Fee(s) Transmittal should be completed and an extra copy of the form should be submitted. If an equivalent of Part B is filed, a request to reapply a previously paid issue fee must be clearly made, and delays in processing may occur due to the difficulty in recognizing the paper as an equivalent of Part B.

III. All communications regarding this application must give the application number. Please direct all communications prior to issuance to Mail Stop ISSUE FEE unless advised to the contrary.

IMPORTANT REMINDER: Utility patents issuing on applications filed on or after Dec. 12, 1980 may require payment of maintenance fees. It is patentee's responsibility to ensure timely payment of maintenance fees when due.

### PART B - FEE(S) TRANSMITTAL

### Complete and send this form, together with applicable fee(s), to: Mail Mail Stop ISSUE FEE

Commissioner for Patents P.O. Box 1450 Alexandria, Virginia 22313-1450

or Fax (571)-273-2885

INSTRUCTIONS: This form should be used for transmitting the ISSUE FEE and PUBLICATION FEE (if required). Blocks 1 through 5 should be completed where

CURRENT CORRESPONDENCE ADDRESS (Note: Use Block 1 for any change of address)  80600 7590 05/28/2010				Fee(: pape	s) Transmittal This certi	ficate cannot be used for such as an assignment	domestic mailings of the rany other accompanying to r formal drawing, must
Harness, Dicke 5445 Corporate Troy, MI 48098		I her State addre trans	eby certify that this Fee(	e of Mailing or Transn s) Transmittal is being fficient postage for first ISSUE FEE address (1) 273-2885, on the da	nission deposited with the United t class mail in an envelope above, or being facsimile tte indicated below.		
							(Depositor's name)
							(Signature)
							(Date)
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nonprovisional	NO	\$1510	\$300		\$0	\$1810	08/30/2010
EXAMINER		ART UNIT	CLASS-SUBCLASS	;			
EGWIM, KEI	ECHI CHIDI	1796	524-379000	_			
"Fee Address" ind PTO/SB/47; Rev 03-0 Number is required.  3. ASSIGNEE NAME A PLEASE NOTE: Uni	ND RESIDENCE DATA less an assignee is identi h in 37 CFR 3.11. Comp	' Indication form ed. Use of a Customer A TO BE PRINTED ON	or agents OR, alter (2) the name of a s registered attorney 2 registered patent listed, no name wil THE PATENT (print o data will appear on the T a substitute for filing	nativingle or a attor l be per typene pag an a	e firm (having as a memb gent) and the names of u neys or agents. If no nan orinted.  e)  tent. If an assignee is i	per a 2p to a 3dentified below, the do	ocument has been filed for
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4a. The following fee(s)  Issue Fee Publication Fee (N Advance Order -	<ul> <li>4b. Payment of Fee(s): (Please first reapply any previously paid issue fee shown above)</li> <li>A check is enclosed.</li> <li>Payment by credit card. Form PTO-2038 is attached.</li> <li>The Director is hereby authorized to charge the required fee(s), any deficiency, or credit any overpayment, to Deposit Account Number (enclose an extra copy of this form).</li> </ul>						
NOTE: The Issue Fee an	as SMALL ENTITY statu	us. See 37 CFR 1.27.	ed from anyone other th		ger claiming SMALL EN ne applicant; a registered		R 1.27(g)(2). e assignee or other party in
interest as shown by the	records of the United Sta	tes Patent and Trademark	k Office.				
Authorized Signature					Date		
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5445 Corporate Drive				ART UNIT	PAPER NUMBER		
Troy, MI 48098				1796			
				DATE MAILED: 05/28/2010			

# Determination of Patent Term Adjustment under 35 U.S.C. 154 (b)

(application filed on or after May 29, 2000)

The Patent Term Adjustment to date is 310 day(s). If the issue fee is paid on the date that is three months after the mailing date of this notice and the patent issues on the Tuesday before the date that is 28 weeks (six and a half months) after the mailing date of this notice, the Patent Term Adjustment will be 310 day(s).

If a Continued Prosecution Application (CPA) was filed in the above-identified application, the filing date that determines Patent Term Adjustment is the filing date of the most recent CPA.

Applicant will be able to obtain more detailed information by accessing the Patent Application Information Retrieval (PAIR) WEB site (http://pair.uspto.gov).

Any questions regarding the Patent Term Extension or Adjustment determination should be directed to the Office of Patent Legal Administration at (571)-272-7702. Questions relating to issue and publication fee payments should be directed to the Customer Service Center of the Office of Patent Publication at 1-(888)-786-0101 or (571)-272-4200.

	Application No.	Applicant(s)
	10/510,993	STUBBE ET AL.
Notice of Allowability	Examiner	Art Unit
	Dr. Kelechi C. Egwim	1796
The MAILING DATE of this communication apperall claims being allowable, PROSECUTION ON THE MERITS IS herewith (or previously mailed), a Notice of Allowance (PTOL-85) NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RI of the Office or upon petition by the applicant. See 37 CFR 1.313 1. ☑ This communication is responsive to the RCE filed 05/03/2	(OR REMAINS) CLOSED in this or other appropriate communication. This application is subjected and MPEP 1308.	s application. If not included ation will be mailed in due course. <b>THIS</b>
2. \( \times \) The allowed claim(s) is/are 1-7 and 9-24.		
3. Acknowledgment is made of a claim for foreign priority una) All b) Some* c) None of the:  1. Certified copies of the priority documents have 2. Certified copies of the priority documents have 3. Copies of the certified copies of the priority documents have International Bureau (PCT Rule 17.2(a)).  * Certified copies not received:  Applicant has THREE MONTHS FROM THE "MAILING DATE" noted below. Failure to timely comply will result in ABANDONM THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.	been received.  been received in Application Not been received in the cuments have been received in the communication to file a research of this application.	o this national stage application from the eply complying with the requirements
<ul> <li>4. A SUBSTITUTE OATH OR DECLARATION must be subm INFORMAL PATENT APPLICATION (PTO-152) which give 5. CORRECTED DRAWINGS (as "replacement sheets") must (a) including changes required by the Notice of Draftspers 1) hereto or 2) to Paper No./Mail Date</li> <li>(b) including changes required by the attached Examiner's Paper No./Mail Date</li> <li>Identifying indicia such as the application number (see 37 CFR 1. each sheet. Replacement sheet(s) should be labeled as such in the factor of the deposit of the de</li></ul>	es reason(s) why the oath or decest be submitted.  It is non's Patent Drawing Review (Fig. 1).  It is Amendment / Comment or in the decest according to 37 CFR 1.  It is of BIOLOGICAL MATERIA.	claration is deficient.  PTO-948) attached  the Office action of  rawings in the front (not the back) of 121(d).  AL must be submitted. Note the
Attachment(s)  1. ☐ Notice of References Cited (PTO-892)  2. ☐ Notice of Draftperson's Patent Drawing Review (PTO-948)  3. ☐ Information Disclosure Statements (PTO/SB/08), Paper No./Mail Date  4. ☐ Examiner's Comment Regarding Requirement for Deposit of Biological Material	5. Notice of Inform 6. Interview Sumn Paper No./Mai 7. Examiner's Am 8. Examiner's Sta 9. Other	nary (PTO-413), I Date

Application/Control Number: 10/510,993 Page 2

Art Unit: 1796

## Continued Examination Under 37 CFR 1.114

1. A request for continued examination under 37 CFR 1.114 was filed in this application after a decision by the Board of Patent Appeals and Interferences, but before the filing of a Notice of Appeal to the Court of Appeals for the Federal Circuit or the commencement of a civil action. Since this application is eligible for continued examination under 37 CFR 1.114 and the fee set forth in 37 CFR 1.17(e) has been timely paid, the appeal has been withdrawn pursuant to 37 CFR 1.114 and prosecution in this application has been reopened pursuant to 37 CFR 1.114. Applicant's submission filed on 05/03/2010 has been entered.

### Election/Restrictions

2. Claim 1 is directed to an allowable product. Pursuant to the procedures set forth in MPEP § 821.04(B), claims 21-23, directed to the process of making or using an allowable product, previously withdrawn from consideration as a result of a restriction requirement, are hereby rejoined and fully examined for patentability under 37 CFR 1.104.

Because all claims previously withdrawn from consideration under 37 CFR 1.142 have been rejoined, the restriction requirement as set forth in the Office action mailed on 01/17/2007 is hereby withdrawn. In view of the withdrawal of the restriction requirement as to the rejoined inventions, applicant(s) are advised that if any claim presented in a continuation or divisional application is anticipated by, or includes all the limitations of, a claim that is allowable in the present application, such claim may be

subject to provisional statutory and/or nonstatutory double patenting rejections over the claims of the instant application. Once the restriction requirement is withdrawn, the provisions of 35 U.S.C. 121 are no longer applicable. See *In re Ziegler*, 443 F.2d 1211, 1215, 170 USPQ 129, 131-32 (CCPA 1971). See also MPEP § 804.01.

3. Due to amendments and persuasive arguments by applicant, the previous rejections of record have been overcome and are hereby withdrawn.

### **REASONS FOR ALLOWANCE**

4. The following is an examiner's statement of reasons for allowance:

None of the prior art is found to teach or sufficiently suggest the aqueous dispersion, comprising the claimed functionalized swellable polymer, the surface-modified, cationically stabilized, inorganic nanoparticles modified with at least one compound of the formula I, in combination with at least one separate chelate ligand forming compound and at least one separate crosslinking agent, wherein the aqueous dispersion has a pH of from 2 to 7.

Thus, claims 1-7, 9-20 and 24 to the dispersion and claims 21-23 to the processes of preparing and using the dispersion are allowed.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Dr. Kelechi C. Egwim whose telephone number is (571) 272-1099. The examiner can normally be reached on M-T (7:30-6:00).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David Wu can be reached on (571) 272-1114. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Dr. Kelechi C. Egwim/ Primary Examiner, Art Unit 1796